

AMENDMENT

IN THE CLAIMS:

Please amend the claims as follows:

1. (Currently amended) An isolated polypeptide ~~or variant thereof comprising a polypeptide sequence having substantial identity to a wild type ricin A chain first globular domain sequence~~ and having a polypeptide sequence selected from the group consisting of SEQ ID NO:3, SEQ ID NO:4, SEQ ID NO:5, SEQ ID NO:6, SEQ ID NO:7, SEQ ID NO:8, SEQ ID NO:9, SEQ ID NO:10, and SEQ ID NO:11, lacks detectable N-glycosidase-rRNA activity or exhibits reduced N-glycosidase-rRNA activity as compared to a ~~control~~ wild type ricin A chain.
2. (Currently amended) The polypeptide of claim 1, wherein the polypeptide retains the ~~functional integrity of the~~ neutralizing immunological epitope of wild type ricin A chain.
3. (Original) The polypeptide of claim 1, wherein the polypeptide has an aqueous solubility that is greater than the solubility of wild type ricin A chain.
4. (Currently amended) The polypeptide of claim 1, wherein the wild type ricin A chain ~~first globular domain sequence is SEQ ID NO:2 or a variant thereof~~ comprises SEQ ID NO:1.
5. (Currently amended) The polypeptide of claim 1, wherein the polypeptide sequence comprises SEQ ID NO:3; or SEQ ID NO:4; ~~or a variant thereof~~.
6. (Canceled).
7. (Currently amended) The polypeptide of claim 1, wherein the polypeptide sequence lacks a hydrophobic loop ~~that corresponds to the hydrophobic loop of wild type ricin A chain~~.
8. (Canceled).
9. (Original) The polypeptide of claim 1, made by recombinant DNA techniques.

10. (Original) The polypeptide of claim 1, made by proteolytically cleaving the first globular domain and the second globular domain of ricin A chain and then purifying the first globular domain.

11-13. (Canceled).

14. (Original) A pharmaceutical composition comprising at least one polypeptide or variant of claim 1 in an immunogenic amount and a pharmaceutically acceptable vehicle.

15. (Original) The pharmaceutical composition of claim 14, and further comprising an adjuvant.

16. (Original) The pharmaceutical composition of claim 14, wherein the composition is capable of eliciting an immune response when administered to a subject.

17. (Original) The pharmaceutical composition of claim 16, wherein the immune response is a protective immune response.

18-23. (Canceled).

24. (Currently amended) A kit comprising at least one of the following

(a) ~~an isolated polypeptide or variant thereof comprising a polypeptide sequence having substantial identity to a wild type ricin A chain first globular domain sequence and lacks detectable N-glycosidase rRNA activity or exhibits reduced N-glycosidase rRNA activity as compared to a control~~ the isolated polypeptide of claim 1; and

(b) ~~an antibody raised against the isolated polypeptide or variant of (a);~~

(c) ~~a pharmaceutical composition comprising at least one polypeptide or variant of (a) of claim 1 in an immunogenic amount and a pharmaceutically acceptable vehicle; and~~

(d) ~~a vaccine comprising an immunogenic amount of at least one polypeptide or variant of (a);~~

packaged together with instructions for use.